Marketing of Ornamental Shrubs and Trees by West Virginia Nurseries

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Summary

IN 1954, about three-tenths of West Virginia's registered nurseries utilized the services of at least one man whose full-time duties were to raise and market ornamental plants. Most of these concerns were centered around the State's cities with populations larger than 19,000.* They marketed about 365,000 ornamental plants. More broad-leaved evergreen shrubs were sold than any other class of ornamentals. Out-of-state wholesale purchases exceeded in-state wholesale purchases, and out-of-state wholesale sales exceeded in-state wholesale sales.

At least seven problem areas were involved in the marketing methods followed:

1. Although a centrally-located nursery can sell at retail advantageously, the growing city tends to surround the nursery and may raise its costs.

2. Interrelated activities cause problems of management for a large, diversified nursery.

3. Plants hardy in the locality of a producer may be subject to winter-killing in nearby sections of the State.

4. Many small cities and towns are not serviced by West Virginia nurseries.

5. Plants grown in cans are not raised extensively in the State's nurseries, although such plants are suited especially to cash-and-carry sales.

6. The grading system followed is not definitive concerning the foliage density of evergreen shrubs, and it is therefore partially ineffective.

7. The practice of free, local retail delivery tends to discourage cash-and-carry sales.

*See footnote 7, page 4.

THE AUTHOR

Roger W. Pease, author of *Marketing of Ornamental Shrubs and Trees by West Virginia Nurseries,* is Assistant Agricultural Economist in the West Virginia University Agricultural Experiment Station.

West Virginia University
Agricultural Experiment Station
College of Agriculture, Forestry, and Home Economics
A. H. VanLandingham, Acting Director
Morgantown

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ROGER W. PEASE

Introduction

THIS bulletin is based on 1954 data obtained in 1955-56 during a survey of all West Virginia nurseries engaged in growing ornamental shrubs and trees. Roses, Christmas trees, fruit and nut-bearing trees, and ground covers were not included in the survey.

The bulletin has two objectives: first, to describe the State's full-time[1] nurseries, the services they perform, and the classes and volumes of plants handled; and second, to discuss some of the problems involved in the marketing practices followed.

Data concerning plant sales and purchases are based on nurserymen's estimates and therefore are indicative rather than precise.

Part I: A Description of Full-Time West Virginia Nurseries and Their Marketing Operations

The Nurseries

IN 1954 there were 51 full-time nurseries in West Virginia engaged in growing ornamental shrubs and trees. For the sake of brevity, these 51 full-time ornamentals nurseries henceforth will be called nurseries. They comprised about three-tenths of all of the nurseries registered at the West Virginia Department of Agriculture.

The sizes of the nurseries varied from 0.25 to 245 acres. The latter figure includes the total acreage of three branches of one large concern. The total nursery acreage in the State was 709.4; the average, 13.9; and as many nurseries comprised less than 2.75 acres as more. Total sales reported for all nurseries were almost 365,000 plants;[2] the average was 7,153; and as many nurseries sold less than 2,000 plants as sold more. These figures include sales of rooted cuttings and "lining out stock."[3]

[1]A nursery was classified as a full-time concern if, for at least nine months in 1954, had utilized the full-time services of at least one man, either as owner or employee.

[2]Physical rather than monetary units were used, to avoid fluctuations in the purchasing power of money.

[3]"Lining-out stock" and "liners" are terms used to identify young plants ready to set in the field.

The age of nurseries, as reported by owners, varied from two to 65 years. The average age was 15.2 years, and as many nurseries had operated less than 12 years as had operated longer. The association between the numbers of years nurseries had been in business and the numbers of plants they sold was negligible.[4]

Trade Organizations

Less than one-third of the State's full-time nurseries were represented in the American Association of Nurserymen, but more than three-fifths reported at least one membership in the State association. Several representatives from some of the larger concerns were members of the State group. The size of nurseries, as indicated by numbers of plants sold, was associated with membership in the West Virginia Nurserymen's Association, but not at a statistically significant level.[5]

Location

The Association between the State's Largest Cities and the Location of Nurseries is indicated in Figure 1.[6] In 1954, West Virginia's 51 full-time nurseries were clustered around those cities whose incorporated areas had populations greater than 19,000.[7] Twenty-eight nurseries were ten or less miles from the cities' approximate centers; 16 were 11-20 miles away; four, 21-30 miles away; and three, more than 30 miles. Distances were estimated in whole numbers only. Henceforth nurseries located within these distance limits will be designated as Group I, Group II, Group III, Group IV, respectively.

The number of plants sold in each of the four distance groups is represented in Figure 2. The total sales in Group I were about 125,000 plants; in Group II, about 165,000; in Group III, about 51,000; and in Group IV, about 23,000 plants.

The numbers of plants sold per nursery, as indicated in Figure 3, have a different group relationship from that shown in Figure 2. On the basis of total plants sold, Group I marketed more than five times as many plants as Group IV; but Group IV, on a per nursery basis, mar-

[4]The correlation coefficient between the ages of nurseries and the numbers of plants sold was 0.1375. A coefficient of 1.0 indicates a perfect association.

[5]Analysis of variance showed an F value of 3.26, when 4.03 was needed for the 5 per cent level of significance.

[6]For a detailed discussion of the effects of location, see: *Some Effects of Location on West Virginia Nurseries Marketing Ornamental Plants,* Roger W. Pease, Bul. 394. W. Va. Univ. Agr. Exp. Sta., Morgantown, W. Va., Feb., 1957.

[7]The market areas studied were selected on the basis of population. In 1950, Beckley, the smallest city of the group, had a population of 19,397 and ranked tenth among the State's municipalities. It also was the smallest city with one or more full-time retail nurseries in the vicinity.

FIGURE 1. The Approximate Location of Full-Time West Virginia Nurseries in Relation to the State's Incorporated Areas with Populations Greater than 19,000, 1954.*

*Numbers give the cities' approximate locations and their population in thousands, as of the 1950 Census. Weirton, population 21,005, was omitted because Follansbee, Wellsburg, and other thickly-populated areas link it to the Wheeling market center.

keted almost twice as many as Group I. Groups II and III sold the largest numbers of plants per nursery: 11,146 and 12,801 respectively.

The relation between total sales of plants in each group and the numbers sold wholesale and retail in the same group is shown in Figure 4. Retail plant sales in Group I were 84 per cent of the group's total sales; in Group II, 16 per cent; in Group III, 21 per cent; and in Group IV, 5 per cent. The number of plants sold at wholesale in Group I was 16 per cent of the group's total; in Group II, 84 per cent; in Group III, 79 per cent; and in Group IV, 95 per cent.

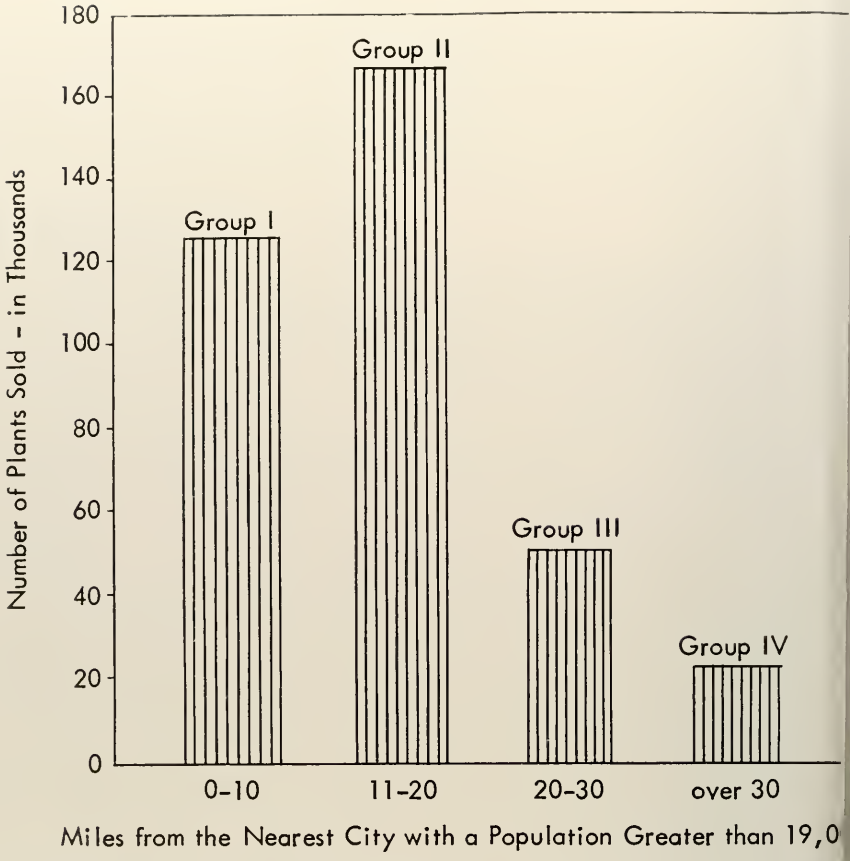


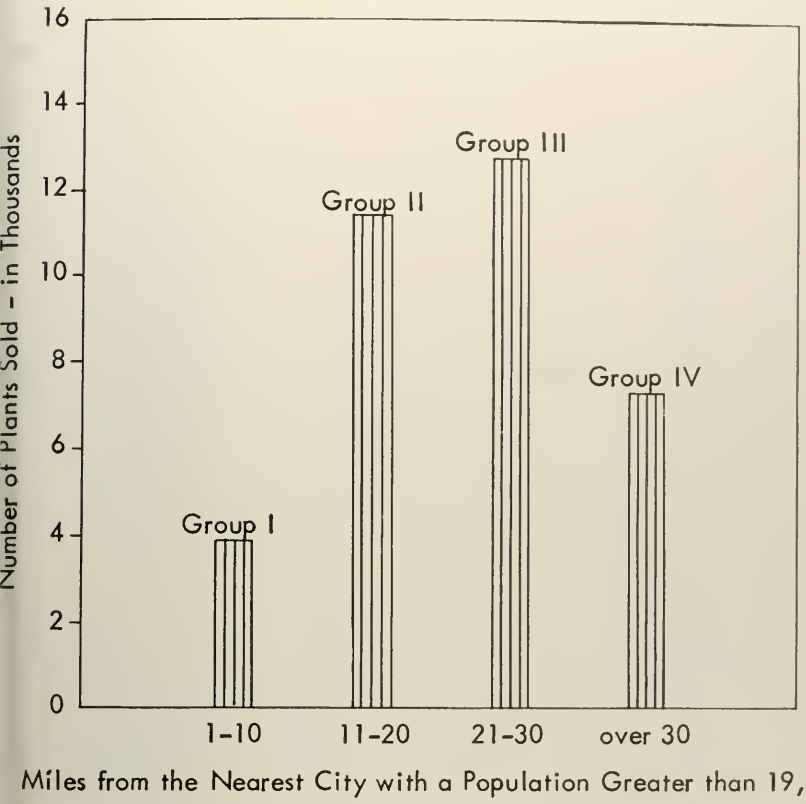
FIGURE 2. The Total Number of Plants Sold in Each of Four Groups of Ful Time West Virginia Nurseries, 1954.

Three *predominant nurseries*[8] were near (or in) the central cities o West Virginia's three urbanized areas,[9] one near each city. Each of thes nurseries marketed more than twice as many ornamental plants as di any other nursery in the same urbanized area. These three predominan concerns sold more plants at retail than did the 23 full-time West Vi ginia nurseries in Groups II, III, and IV.

Predominant nurseries were not always near the six other We Virginia cities whose populations exceeded 19,000. A Group I nurse was predominant in each of two cities; a Group II nursery in each o three; and most of the ornamental plant sales in the sixth city we

[8]A predominant nursery is defined in this study as one which sells more than twi as many ornamental plants as does any other nursery specializing in retail sales within t same city.

[9]"Each urbanized area contains at least one city with 50,000 inhabitants or more. . Census of 1950.



IGURE 3. The Total Number of Plants Sold per Nursery in Each of Four roups of Full-Time West Virginia Nurseries, 1954.

istributed among three leading nurseries: one in Group I and two in V. None of these three nurseries was predominant.

From the preceding description of nursery location and its relaonships with sales, the following conclusions may be drawn:

1. In 1954 more than one-half (28) of West Virginia's full-time urseries were in or very near cities with populations greater than 19,000; id as distances from these cities increased, nurseries tended to be disibuted more sparsely. (Figure 1.)

2. These 28 centrally-located concerns sold comparatively few plants holesale, less than one-fifth of their total plant sales. (Figure 4.)

3. Per-nursery sales of plants among the centrally-located nurseries ere less than among the other nurseries. (Figure 3.)

4. Three predominant nurseries operated in the State's three urbaned areas, but in these areas the presence of 11 other full-time concerns sured competition. (Figure 1.)

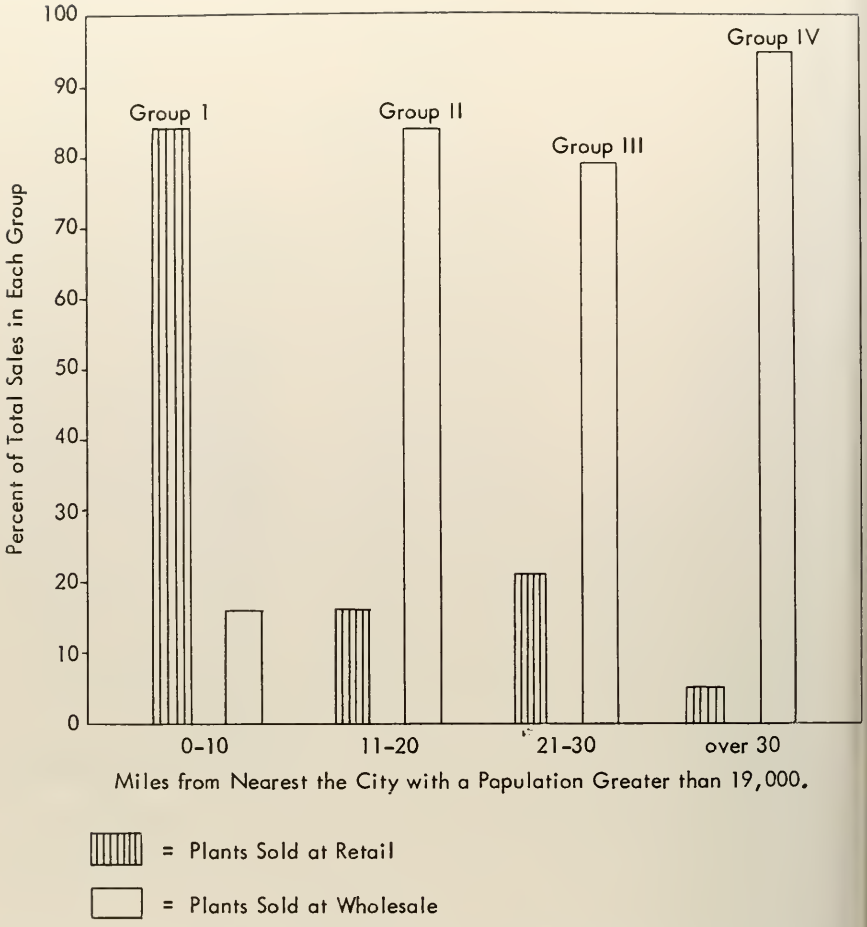


FIGURE 4. The Proportions of Plants Sold at Wholesale and at Retail in Each of Four Groups of Full-Time West Virginia Nurseries, 1954.

Classes of Plants, Volumes of Sales and Purchases

The plants handled were divided arbitrarily into six classes. These classes and some examples of each class are listed below:

Broad-leaved

1. Evergreen
   Shrubs - - - All Hollies, Rhododendron, Laurel.
   Narrow-leaved
2. Evergreen
   Shrubs - - - All Junipers, all Yews, and add Arborvitae.

Broad-leaved

3. Evergreen
   Trees - - - Evergreen magnolias.
   Narrow-leaved
4. Evergreen
   Trees - - - Spruce, Hemlock, Pine.
5. Deciduous
   Shrubs - - - All Azaleas, Forhythia and Lilacs.
6. Deciduous
   Trees - - - Dogwood, Maple, Oak.

The volume of plant sales in each of the six classes is shown in Table 1. The total number of plants reported sold was about 365,000. Sales volumes were in the following order:

Broad-leaved Evergreen Shrubs	about	155,000
Narrow-leaved Evergreen Shrubs	about	96,000
Narrow-leaved Evergreen Trees	about	74,000
Deciduous Shrubs	about	23,000
Deciduous Trees	about	15,000
Broad-leaved Evergreen Trees[10]	about	1,500

TABLE 1. THE NUMBERS OF PLANTS OF VARIOUS CLASSES SOLD BY FULL-TIME WEST VIRGINIA NURSERYMEN: TOTAL SALES AND THE PROPORTIONS SOLD AT RETAIL AND AT WHOLESALE, 1954.

CLASSES OF PLANTS	TOTAL SALES	PROPORTIONS	
		RETAIL	WHOLESALE
	Number	*Per cent*	*Per cent*
Broad-leaved Evergreen Shrubs	155,107	29	71
Narrow-leaved Evergreen Shrubs	96,120	49	51
Broad-leaved Evergreen Trees	1,366	99+	Negligible
Narrow-leaved Evergreen Trees	74,324	27	73
Deciduous Shrubs	22,628	92	8
Deciduous Trees	15,397	66	34
All Classes	364,942	40	60

Three-fifths of the plants were marketed wholesale. However, retail sales exceeded wholesale sales in three classes of ornamentals: Broad-leaved Evergreen Trees, Deciduous Shrubs, and Deciduous Trees. About 40 per cent of all the ornamental plants sold were broad-leaved evergreen

[10]Hardy only in southern West Virginia, especially near the Ohio River.

shrubs. More than one-half of the broad-leaved evergreen shrubs, narrow-leaved evergreen shrubs, and narrow-leaved evergreen trees were sold out-of-state. In all other classes, in-state sales exceeded out-of-state sales. (Tables 2 and 3.)

Retail sales among the various plant classes are shown in Table 2. The retail sales volumes of the six classes, arranged in order, were as follows.

Narrow-leaved Evergreen Shrubs	about	47,000
Broad-leaved Evergreen Shrubs	about	45,000
Deciduous Shrubs	about	21,000
Narrow-leaved Evergreen Trees	about	20,000
Deciduous Trees	about	10,000
Broad-leaved Evergreen Trees	about	1,500

Retail sales of all classes totaled more than 144,500 plants, and in-state sales comprised considerably more than 95 per cent of all the plants sold at retail.

Wholesale sales volumes of the six classes, Table 3, were in the following order:

Broad-leaved Evergreen Shrubs	about	110,000
Narrow-leaved Evergreen Trees	about	54,000
Narrow-leaved Evergreen Shrubs	about	49,000
Deciduous Trees	about	5,000
Deciduous Shrubs	about	2,000
Broad-leaved Evergreen Trees		5

Table 2. The Numbers of Plants of Various Classes Sold at Retail by Full-Time West Virginia Nurserymen: Total Sales and the Proportions Sold In-state and Out-of-state, 1954.

Classes of Plants	Total Sales	Proportions	
		In-State	Out-of-State
	Number	*Per cent*	*Per cent*
Broad-leaved Evergreen Shrubs	45,100	99	1
Narrow-leaved Evergreen Shrubs	46,804	93	7
Broad-leaved Evergreen Trees	1,361	99	1
Narrow-leaved Evergreen Trees	20,469	97	3
Deciduous Shrubs	20,704	96	4
Deciduous Trees	10,125	100	0
All Classes	144,563	96	4

Table 3. The Numbers of Plants of Various Classes Sold at Wholesale by Full-Time West Virginia Nurserymen: Total Sales and the Proportions Sold In-state and Out-of-state, 1954.

Classes of Plants	Total Sales	Proportions	
		In-State	Out-of-State
	Number	*Per cent*	*Per cent*
Broad-leaved Evergreen Shrubs	110,007	16	84
Narrow-leaved Evergreen Shrubs	49,316	21	79
Broad-leaved Evergreen Trees	5	100	0
Narrow-leaved Evergreen Trees	53,855	28	72
Deciduous Shrubs	1,924	95	5
Deciduous Trees	5,272	18	82
All Classes	220,379	21	79

About one-half of all ornamental plants sold wholesale were broad-leaved evergreen shrubs, and wholesale sales of all classes totaled about 220,000 plants.

More than three-quarters of the wholesale sales were made out-of-state, and only wholesale sales of broad-leaved evergreen trees and deciduous shrubs were made predominantly in West Virginia.

The numbers of plants purchased by full-time nurseries, arranged in order, were as follows (Table 4):

Broad-leaved Evergreen Shrubs ..... about 62,000
Narrow-leaved Evergreen Shrubs ..... about 41,000
Narrow-leaved Evergreen Trees ..... about 19,000
Deciduous Trees ..... about 17,000
Deciduous Shrubs ..... about 14,000
Broad-leaved Evergreen Trees ..... about 600

The total number of plants purchased was about 155,000.

Data in Table 4 and the preceding data concerning plant sales and purchases indicate:

1. That sales of evergreen shrubs and trees were more than eight times as great as were sales of deciduous shrubs and trees. (Table 1.)

2. Wholesale sales exceeded retail sales by more than 75,000 plants. (Tables 2 and 3.)

3. Four per cent of retail sales and 79 per cent of wholesale sales were made out-of-state. (Tables 2 and 3.)

4. More than 80 per cent of the plants purchased by nurseries were procured out-of-state. (Table 4.)

5. More than 60 per cent of the plants purchased by nurseries were liners. (Table 4.)

Table 4. The Numbers of Plants of Various Classes Purchased by Full-Time West Virginia Nurserymen: Totals, and the Proportions of Liners and of In-state and Out-of-state Purchases, 1954.

Classes of Plants	Total Sales	Proportions		
		In-State	Out-of-State	Liners
	Number	*Per cent*	*Per cent*	*Per cent*
Broad-leaved Evergreen Shrubs	62,231	17	83	78
Narrow-leaved Evergreen Shrubs	40,601	25	75	59
Broad-leaved Evergreen Trees	601	24	76	26
Narrow-leaved Evergreen Trees	19,395	13	87	74
Deciduous Shrubs	14,310	14	86	79
Deciduous Trees	17,380	16	84	1—
All Classes	154,518	18	82	64

Major Activities

Some nurseries functioned partially as dealers.[11] Four concerns reported that they sold, in 1954, only what plants they had purchased during the same year. On the other hand, six nurseries made no purchases in 1954 and sold only plants which they had grown. Data are not available concerning the extent of purchases and quick re-sale among the other 41 nurseries.

The performance of services[12] was an important activity for most of the 49 nurseries which sold plants at retail. More than two-thirds of their total retail sales were incidental to services. Each of 11 concerns reported that all of its retail plant sales were contingent to services; 12 reported between 90 and 100 per cent; 21 less than 90 per cent; and five did not perform services.

Other horticultural businesses were run by 16 owner-operators in conjunction with their ornamentals nurseries. Of these, nine operated greenhouses for the production of floricultural products, one operated a fruit orchard, and five, without greenhouse facilities, sold floricultural products or vegetable plants. Data are not available concerning the number of nursery owner-operators who had sources of income other than from sale of horticultural products.

[11]Dealers are classified herein as concerns marketing ornamental plants without placing them in the soil even if the plants are in containers. Dealers usually buy ornamentals for quick resale.

[12]Services, as used in this bulletin, include maintaining and landscaping customers' grounds, also planting and caring for their ornamental shrubs and trees.

Grades and Grading

All but one nursery operator reported that they were familiar with the grading standards published by the American Association of Nurserymen. Nurserymen who consistently sold at wholesale used this grading system for such sales. Those selling at retail reported that they made no intensive effort to familiarize retail customers with the grading system and stated that customers were primarily interested in prices and in the general appearance of plants. Several nurserymen also reported that the grading system is not definitive concerning the crown-density advocated for evergreen shrubs.

Guarantees

Only one nursery guaranteed the plants it sold at wholesale. Of the concerns which customarily made retail sales, 40 gave retail guarantees, and nine gave none. Six of the 40 nurseries guaranteed their plants to live for a period of six months after sale, but the other 34 guaranteed for a full year. During the period of guarantee no replacement charges were made by 23 nurseries; half-replacement charges were made by 12, and five followed other practices. Often plants were replaced only if they had been planted by the nursery; sometimes "neglect" by the purchaser resulted in the forfeit of a guarantee; often guarantees were limited to one replacement, but a nurseryman reported that he had replaced one plant several times for an "old" customer.

Packaging

Exclusive of lining-out stock and rooted cuttings, more than three-fourths of all the ornamental plants sold were reported to have been packed "balled and burlapped."[13] The rest were sold with bare roots or in containers such as paper pots, tin cans, or baskets.

Delivery and Transportation

More than 90 per cent of the plants sold wholesale were shipped at the buyers' expense and responsibility, but almost 75 per cent of the reported retail sales were delivered by the nurserymen, free of charge. Some of these free deliveries were made in conjunction with the performance of services, some only after specified numbers of plants had been ordered, some only after enough orders had been received to make a "pay load" feasible, some only within a radius of about 20 miles;

[13]When a plant is packed "balled and burlapped," it is dug with a ball of soil around the roots, and this ball is wrapped tightly with burlap.

and, in a few cases, nursery owners reported that they made special trips for the free delivery of a "very few" plants to "old" customers.

Methods of Retailing

Eight methods of retailing plants were reported by nursery operators:

1. Nursery representatives procured orders incidental to the performance of landscaping, maintenance, and tree-surgery services.

2. Sales yards were maintained at nurseries. In these yards ornamental plants were kept balled and burlapped, or in containers, and usually were displayed in sawdust beds.

3. No display areas were maintained, but plants were dug to order, directly from the nursery rows.

4. One nursery, situated about 20 miles from a city, maintained a retail sales lot and service center on the outskirts of the city.

5. Three of the larger nurseries, situated about ten miles from cities, maintained garden centers in the cities. Here many types of supplies for home gardens were sold. Beds of ornamentals also were maintained for purposes of display and sales.

6. Several independent garden centers grew a few ornamental plants, usually in containers, and maintained display areas for ornamentals.

7. One nursery maintained a huckster-agent[14] who sold ornamental plants in an area remote from any established nursery.

8. Several hucksters sold ornamentals in the larger cities, filling orders by immediate purchases from local nurseries but growing a few plants to greater maturity.

No nursery catered to the mail-order trade.

Promotional Activities

To increase plant sales, nurserymen followed various practices:

The performance of services was an indirect method for promoting retail sales among more than three-fourths of the nurseries.

Printed price lists were distributed by five concerns. None of these lists carried directions for cultural care, but two gave descriptive information about the plants.

Advertisements in at least one local paper were maintained by almost one-half of the nurseries, and 43 reported that they advertised in the classified sections of local telephone directories.

Special plant sales were advertised periodically by only three nurseries.

[14]The term huckster, as used herein, denotes a peddler of ornamental plants.

Signs at or near the entrances to nurseries or sales lots were maintained by 38 concerns, but only one placed additional signs along the highway to catch the attention of approaching motorists. More than half of the signs could not be read from a distance of 200 feet.

Discounts or special prices for cash-and-carry retail sales were offered by no nursery, although all but one reported that they wished to increase their cash-and-carry businesses.

Part II: Problems Facing Full-Time West Virginia Nurseries

Location and Land

CITIES sometime expand until they surround adjacent nurseries. Costs may increase, and although the nursery land itself could be sold advantageously, at least three forces tend to discourage its sale:

1. Moving away from the city might disrupt a nursery's established retail trade and give an advantage to those in-city concerns which own little land, concentrate on services, and are not committed to growing ornamentals in volume.

2. Under such circumstances, permanent equipment such as greenhouses may be difficult to sell advantageously.

3. Mature plants in the ground may be almost as valuable as the land. To move them to a new location is costly. A profitable forced sale of such plants may be difficult, for most nurseries prefer to buy young stock;[15] and retail sales of older plants, in such volumes, are seldom feasible. The longer the decision to move is postponed, the greater may be the handicap under which the crowded nursery operates.

Several West Virginia nurseries have solved, or are solving, this problem. By establishing combined garden and service centers on the outskirts of the city, they assure a continuance, or even an increase, of retail trade. By purchasing desirable land and water resources beyond any apparent danger of city encroachment, and by taking several years to move the plant-production portion of the concern to this new location, some nurserymen avoid losses from forced sales.

Occasionally, a new nursery has anticipated the problem and has started its business with a production area removed from the city and with a retail center on the city's outskirts. Other successful West Virginia nurseries have located where desirable land and water resources are

[15]See Table 4, *Liners*.

relatively cheap. Such locations tend to be remote from the larger cities. These more remote nurseries tend to concentrate on wholesale marketing.

Interrelated Activities

West Virginia's young nurseries usually rely on services in order to procure retail sales.[16] The older, well-established concerns often continue and even expand these services. Thus, the large nurseries in urbanized areas tend to operate landscaping and maintenance branches, tree-surgery departments, large wholesale enterprises, and garden centers. An owner-operator, often primarily interested in plant production, finds it difficult to manage these several enterprises, and it becomes necessary to hire highly-competent personnel, especially for the landscaping department and the garden center. Men with suitable training and experience are difficult to locate and usually are in a position to demand salaries which sometimes are prohibitively high. Young men with adequate training often need several years of experience before they become proficient as branch managers. They, too, are relatively scarce and may be in a position to demand relatively high salaries.

At least one of four courses of action is being followed by an occasional nursery operator:

1. Promising young men from the labor force are being selected and trained to become branch managers.
2. Efforts are being made to enlarge the various retail branches until it becomes feasible to employ technically-trained landscape architects and business managers.
3. Departmentalized activities are being minimized by specialization in wholesaling, in operating garden centers, or in performing services.
4. Because it is more feasible to hire skilled "plantsmen" than highly-trained, nursery business-managers, some owner-operators concentrate on their retail branches and hire "plantsmen" to manage production.

Variable Hardiness of Plants

Variable hardiness presents a problem particularly pertinent in West Virginia. Many nurseries specialize in species and varieties of plants which thrive locally. These plants usually show complete winter hardiness at the nursery, but, when grown at different elevations and in

[16]In 1954 every West Virginia nursery less than five years old procured at least 95 per cent of its retail sales through service.

more rigorous climates, they may not survive. West Virginia's mountains cause extreme variations in climate within relatively short distances. Thus, some "evergreen" azalea varieties listed as hardy north of West Virginia's boundaries, seldom survive in many of the State's higher altitudes or "frost pockets." Yet they are reliably hardy in the Ohio Valley sections. Some of the Asiatic hollies are completely hardy in the southerly river-bottom areas and usually thrive throughout the State. Yet, in 1956-57, heavy losses of a Japanese holly (*Ilex rotundifolia*) discouraged plantings of the variety. This problem is especially relevant to nurserymen who ship plants from a comparatively mild to a more rigorous climate.

Unserviced Areas

Many small cities, towns, and rural communities in West Virginia are more than 30 miles from the nearest full-time nursery. Only two West Virginia nurserymen reported that they consistently performed services in such areas. One huckster-agent reported that he serviced a rural area.

In the past, home owners in these relatively remote areas often procured ornamental plants by driving to distant full-time nurseries, by purchasing from mail-order establishments, by collecting plants "from the wild," or by purchasing from local amateurs or part-time nurseries. In these smaller towns a few stores recently have started to offer ornamentals as a side line.

Procurement

During the past few years West Virginia nurserymen have shown increasing interest in modern garden centers and retail sales lots as means for catering to the "do-it-yourself" market. This market apparently prefers plants younger than those customarily used in the landscape-service trade. Young plants grown in tapered tin cans with removable bottoms are presumed to have the following advantages over the balled-and-burlapped stock for which they are substituted.

1. They can be transplanted successfully throughout the growing season, even when they are in full bloom.

2. They are relatively light in weight, and by their use, transportation costs can be reduced.

3. They can be loaded easily into purchasers' automobiles, and they withstand rough handling.

Nursery losses incurred in over-wintering have discouraged the State's wholesale producers from raising "canned" stock of many of the most saleable plant species and varieties.

One West Virginia nurseryman reported that he drove his own truck to the South and selected the canned stock he desired. He also reported that the cost of the plants plus estimated trucking expenses were less than the cost of the balled-and-burlapped stock for which they were substituted. Customers apparently were satisfied with the rapidly-grown and loosely-sheared Southern plants.

Grades and Grading

The lack of uniformity in grading plants, both for wholesale and retail sales, results in considerable confusion. Some wholesale buyers report that they rely more on the reputation of growers than on specified grades.

The Do-It-Yourself Market

Local nurseries have certain potential advantages in competing for the do-it-yourself market, especially if they maintain modern garden centers or retail sales yards with adequate parking facilities:

1. They are in a position to market freshly-dug plants, undamaged by shipment.

2. They usually have space and equipment adequate to keep the plants well-bedded, shaded, watered, and fertilized.

3. They usually have personnel who know how to handle and load plants with a minimum of damage.

4. Their salesmen are in a position to talk with customers, give them advice, and thus expand sales.

5. Their salesmen usually are familar with the various species and varieties of plants.

A Store handling plants as a side-line also has certain advantages:

1. It has an established walk-in trade and therefore is in a position to benefit from impulse-buying.

2. It is in a position to conduct its ornamentals department at a loss, for purposes of advertising and good will.

3. It can capitalize on the loose grading system by selling ungraded ornamental plants at low prices.

Some Recommendations

Nurserymen should capitalize on their advantages and minimize their disadvantages. Thus they might capitalize on impulse-buying and capture much of the do-it-yourself trade.

Toward this end, they might:

1. *Accustom the public to visiting nursery retail centers.* A well-advertised "opening," lasting several days and accompanied by gifts of young plants, has proved to be an effective start.[17] This beginning might be followed by well-advertised sales days and by a continuous display of low-priced bargains.

2. *Maintain neat and attractive displays* of freshly-dug ornamentals with good foliage color.

3. *Offer reduced prices for cash-and-carry sales.* The customary policy of free delivery may be a desirable adjunct to the performance of services and to sales on credit, but it increases costs and hence prices. Relatively high prices at a garden center encourage cash-and-carry customers to trade elsewhere. These customers may be the "back bone" of the drive-in and do-it-yourself trade for which the garden center probably was established.

[17]During its "opening," one West Virginia garden center which used this technique was visited by several thousand potential customers.

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